

# Pennsylvania

## Archeology:

### An Introduction

The prehistoric stone artifacts of Indian life have aroused the keen interest of an increasingly large company of collectors and amateur archeologists. The professional archeologists, whose efforts are supplemented by the work of many of these amateurs, are encouraged by the wider discernment which they see among collectors today. Many collectors do little more than gather stray arrowheads. But there are many amateurs who systematically gather a variety of artifacts, which, together, give a more complete picture of Indian life.

If he is observant the collector will find, for instance, that certain places produce artifacts of distinctive types. One site yields rough stone points having no barbs or notches, while another gives up fragments of pottery, small triangular arrowpoints, and polished celts (ungrooved axes). A third site yields finely made notched and barbed points as well as platform pipes and slate gorgets, yet it contains very little pottery. Such differences have a meaning, since they show that each site was occupied during a different period of time.

Most sites, however, were inhabited more than once; we know this because we find artifacts of different periods on the same site. A favorable location was used intermittently, or repeatedly, over thousands of years. The big, crude, stemmed points, for instance, were not used by the people who made the pottery, yet these artifacts are sometimes found at the same site. Consequently, we must learn something about Indian prehistory and Indian history to know in which periods particular artifacts belong. Knowing this can add greatly to the interest of collecting.

## THE PALEO-INDIAN PERIOD (12000?-6000 B. C.)

Few people realize how long Pennsylvania has been inhabited. The earliest Indians came here many thousands of years ago, when the glaciers were receding. This marks the beginning of what we call the Paleo-Indian period. The climate was much different from that of today, being, probably, more like that of the Barren Grounds of northern Canada; the landscape was in part tundra, and in part composed of scattered stands of spruce and fir. Small, wandering bands of hunters and their families followed herds of big game animals, mostly of species now extinct.

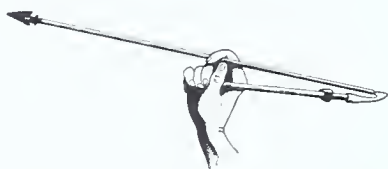


*Fluted Point  
Paleo-Indian*

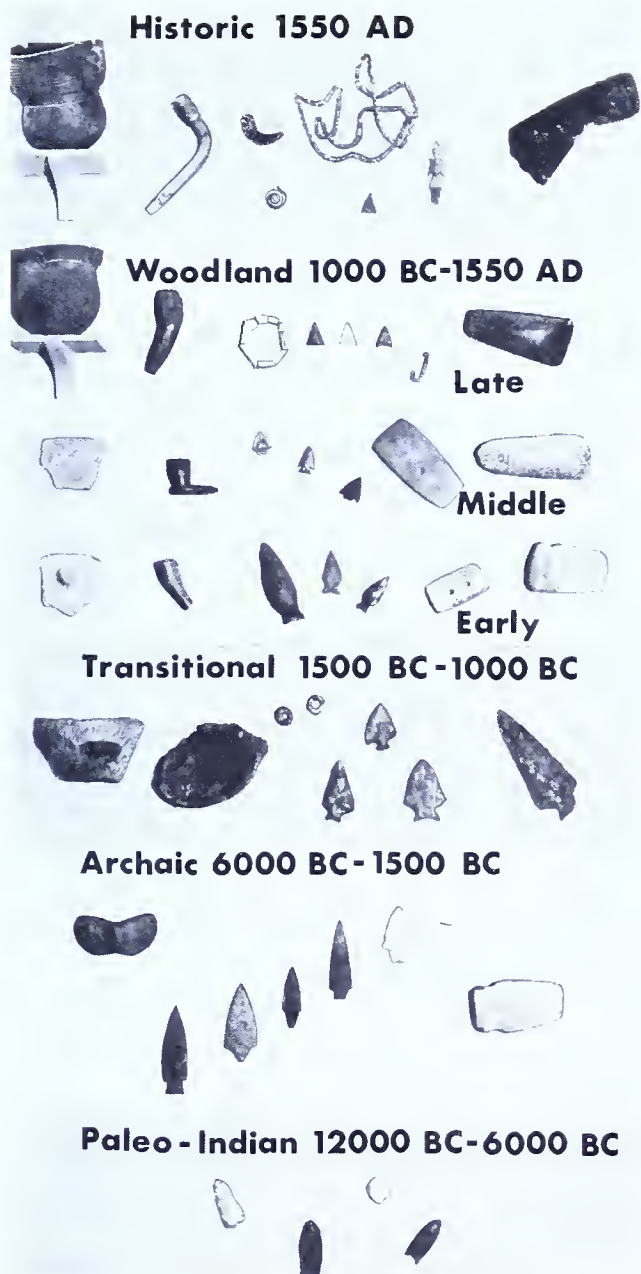
The best-known artifact of the Paleo-Indian is the fluted point. This is a small spearhead distinguished by a channel along each face of the blade, which was made by striking a long flake from the base. These points have been found in most parts of the State, but they are not numerous in any area. The Paleo-Indian period was long—it probably lasted at least 6,000 years—but the population was so small and so constantly on the move that recognizable sites are very rare. Consequently, our knowledge of the period is not as definite and detailed as might be desired.

## THE ARCHAIC PERIOD (6000-1500 B. C.)

By about 8,000 years ago, most of the big game animals of the glacial age had become extinct, and so the Indians developed a different kind of life to suit the new conditions. This was the Archaic period. The Indians still did not live a very settled life, but they did not wander as widely and continually as the Paleo-Indians of earlier times. They used a greater variety of natural resources: shellfish and wild plant foods were important in their diet. These people



*Spear Thrower Archaic Period*



*Development of Indian Tools and Crafts*

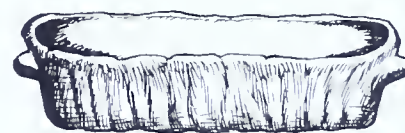
neither planted food nor made pottery, but they did have dogs, and it is probable that they wove cloth during the latter part of the Archaic period.

During the Archaic period an interesting device called the spear thrower came into use. This was a stick about as long as a man's forearm, with a projecting hook at one end, against which the butt end of the spear was set. It enabled the hunter to throw his spear farther and harder, much as if an extra joint had been added to his arm.

A variety of ground and polished stone tools appear in the Late Archaic period. Adzes and grooved axes were chopping and woodworking tools. Carefully-made stone weights were attached to the shaft of the spear thrower to increase the force impelling the dart. One of these was the so-called bannerstone, a ground and polished stone object shaped like a double-bitted axe, with a drilled hole like that of an iron axe-head. Cruder but more common tools were the choppers, roughly chipped stone blades about the size of a man's hand, which were used as hand choppers and cleavers.

### THE TRANSITIONAL PERIOD (1500-1000 B. C.)

During the latter part of the Archaic period and for several centuries afterward, there were also people in Pennsylvania who had a somewhat different mode of life. Their sites are usually, but not always, found along the banks of rivers and may be recognized by the fragments of the soapstone bowls these people made.



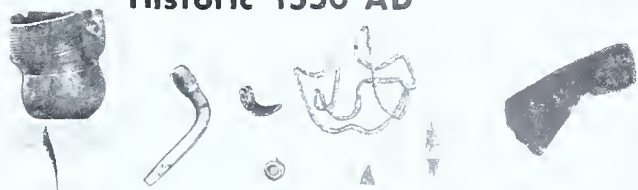
*Soapstone Bowl  
Transitional Period*

Soapstone (or steatite, as it is sometimes called) is a soft grayish stone which can easily be carved with tools of harder stone. It was carved into vessels which, in Pennsylvania, are usually oval or rectangular in shape, and have flat bottoms. Often the bowls have a lug or projection at each end; these probably served as handles. The soapstone vessels were the first in this region in which food could be boiled directly over the fire. Soapstone was also used for ornaments, such as gorgets, pendants, and beads.

Several types of projectile points (often called arrowheads or spears, but which actually are darts used with the spear thrower) are found in sites of this period. They are usually broad and well-chipped; the most common materials are rhyolite and jasper. When projectile points became worn or broken, they were rechipped and became scrapers and drills.



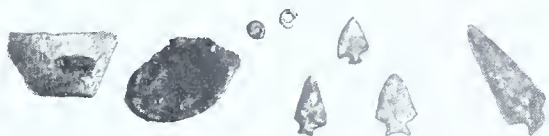
### Historic 1550 AD



### Woodland 1000 BC-1550 AD



### Transitional 1500 BC-1000 BC



### Archaic 6000 BC-1500 BC



### Paleo-Indian 12000 BC-6000 BC



### Development of Indian Tools and Crafts

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## THE WOODLAND PERIOD

(1000 B. C.-1550 A. D.)

The Woodland period, beginning about 1000 B. C., is the era of developed Indian culture. It is marked by two important productive activities which the earlier cultures did not have, agriculture and pottery making.

The Early Woodland culture in Pennsylvania is not well known. Pottery of this period is scarce and is so soft and poorly made that it usually crumbles into small bits. It is very rarely found in collections. Projectile points are usually rather long and narrow. They are stemmed or notched, but the notches are not the narrow, deeply cut notches of the following period.



*Clay Pot  
Early Woodland*

Agriculture was at its very beginning in Pennsylvania, and corn was not one of the first crops grown. More likely, sunflowers and other plant species not familiar to us as food crops were grown by the Early Woodland people. Sunflower seeds are extremely nutritious, and they could be preserved as a reserve for seasons of famine. Apparently, tobacco was also grown, for the first pipes date from this period. These pipes are usually stone tubes, some of them very finely made. Other objects found include ground stone weights for spear throwers, some of them made in the form of birds, and a variety of axes and adzes.

It was during this period that Pennsylvania Indians first led a really settled life. During the Archaic period people had roamed over a limited area, not only the men as hunters but the whole group, and in the Transitional period between the Archaic and Woodland, people seem to have traveled extensively along the rivers. But Early Woodland garden and hoe agriculture, carried on by the women, made settled life possible, though hunting, fishing, and gathering wild plants were still important activities.

Middle Woodland was the period of some of the brilliant "Mound Builder" cultures of Ohio and adjacent areas. In Pennsylvania, however, except in the extreme western section, the



*Platform Pipe  
Middle Woodland*

manifestations of this cultural development are much less spectacular. The general mode of life was much like that of Early Woodland. Pottery fragments are more common than in the Early Woodland period, but the pottery is still crude. The first evidence of corn is found at this time, but probably much of the food was still obtained by hunting, fishing, and gathering wild plants. Pipes are more abundant and more varied in shape than in Early Woodland times.

Projectile points show noticeable changes at this time. They are usually made of choice types of flint, often imported from a great distance. They are finely chipped, with small, deeply cut notches or sharp barbs, and they are smaller and thinner than in previous periods, and therefore lighter. This decrease in weight, along with the disappearance of spear thrower weights, may indicate that the bow was replacing the spear thrower at this time.

The last prehistoric period is known as Late Woodland. In Pennsylvania it probably began about 1000 A. D. and lasted until the first contacts with the culture of the European. It was marked by settled village life supported mainly by intensive agriculture. Sites are usually



*Triangular  
Point  
Late  
Woodland*

found on slightly elevated spots on the low, rich ground along streams, although there are exceptions, especially in southwestern Pennsylvania. Houses of this period were round, oval, or rectangular. The walls were set by driving posts into the ground, and the roofs, semi-cylindrical, domed, or occasionally gabled, were made of bark or mats. Villages were often large, and were occasionally surrounded by a palisade of posts. The village might be moved, perhaps at intervals of ten to fifteen years, when the soil had lost some of its productivity and the supply of firewood was exhausted; the new village was usually established only a few miles away.

Pottery is much more abundant on Late Woodland sites than on those of the earlier periods. Vessels were larger, better made, and more elaborately decorated. The abundance of vessel fragments is very useful to the archeologist, for it is by studying the characteristics of the pottery that we can learn most about



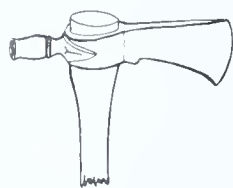
smaller divisions of time periods and about cultural relationships.

The projectile points of this period are true arrowheads, designed for use with the bow. They are small and almost always triangular in shape. Other stone tools are celts (ungrooved axes), small net sinkers, and leaf-shaped knives with rounded bases. Hoes are commonly found on Late Woodland sites; some of them were chipped from shale and notched for the attachment of a handle, while others were shaped from the shoulder blade of the elk or a slice of its antler. Pipes were made of both stone and pottery and are of varied forms. One of the commoner forms is made of clay, with the bowl and stem at obtuse angles to each other. The typical Susquehannock type is the pottery pipe with a long, curved stem expanding into a tulip-shaped bowl. In general, sites of this period yield fewer pieces of chipped and ground stonework than earlier sites, and more artifacts of pottery, bone, and shell.

#### THE HISTORIC PERIOD (1550 A. D. —)

Sites of the historic period are marked by objects of European manufacture — in very small quantities at first, but in greater numbers with time until nearly all of the imperishable material is that bought from the traders. For much of the State the date of the first visible European influence is about 1550 A. D., but trade goods appear earlier near the coast and later in the western part of the State.

The coming of the white man resulted in marked changes in Indian life, and these extended far ahead of actual settlement by Europeans. European diseases—smallpox, tuberculosis, and many others—had a devastating effect on a population which had never built up an immunity to them. Tribes from the coastal areas first occupied by the whites looked for new lands in the interior, but found them already occupied by other tribes. Competition for land, for trade, and for the guns and other equipment necessary to take furs in the quantities the traders wanted led to the constant



*Pipe Tomahawk  
Historic Period*

wars of the early historic period. There was a general breakdown of the old order, which led to the myth, still current, that the Indian was always a wandering hunter and warrior. This belief is completely erroneous; the Indian of late prehistoric times had been sedentary, living by agriculture supplemented by hunting and fishing.

In historic times the fur trade reversed the trend toward a more settled life. Urged on by the depletion of game and the pressure of white settlement, the Indians of eastern Pennsylvania sold their lands. By the early seventeenth century most of them were living along the Susquehanna River. Gradually the tide of settlement advanced westward, and by 1789 all tribal land had been ceded to the State. In 1796 three separate parcels of land were awarded to Chief Cornplanter by the Commonwealth of Pennsylvania. Cornplanter and his people settled upon one, a tract of a little more than a square mile on the Allegheny River in Warren County. This tract was held by Cornplanter's heirs until a few years ago, when the construction of the Kinzua Dam forced the dissolution of the last remaining Indian community in Pennsylvania. The last members of the community departed in 1964.

#### ABOUT COLLECTING INDIAN ARTIFACTS

The person who collects Indian artifacts plays an important role in archeology, a role which can be either helpful or destructive. There are more collectors than professional archeologists. The collector usually searches for artifacts in his own neighborhood, so he knows his area best. Any archeological study of an area depends very heavily on the knowledge of the collectors of that region.

There is a type of collector who is interested only in getting complete and undamaged objects. Such a person may accumulate a large and showy collection, but one which has little significance for the study of archeology. His collection will probably display his own selection of pieces, not a representative sample of the things used by the Indians. Further, his collection will not likely identify the artifacts by site—will not indicate, for example, whether two objects were used by one group or by different groups at different periods.

Another person may begin merely as a collector of artifacts, but as his interest in the Indians who used them grows, he begins to study the functions of the objects and the differences among artifacts from various sites. Above all, he keeps accurate records of his finds. Such a person is not just a collector, he is an amateur archeologist.

Any system of marking your artifacts is good if it will enable you to identify the places from which they came. Cataloging should be done promptly, while the details of the location are still fresh in your mind. One symbol is all that is necessary to catalog all of the artifacts from a single site. The mark on the artifact should be made small and preferably on the rougher side, the one opposite the side you want to exhibit. India ink is the best marking material that is easily available. When it is dry, the mark may be covered with a little colorless nail polish to keep it from rubbing off, particularly from smooth surfaces.

The location of each site should be recorded in a notebook, together with the catalog symbol used to mark the artifacts from that site.

Some artifacts are single finds, such as an arrow point which a hunter shot at an animal and did not recover. But most of them are clustered, marking an area where people lived and worked. These are what we call Indian sites. If you feel you have found a site of some importance, it can be registered with the State survey. If you live in the eastern part of the State, write to the Archeology Section, William Penn Memorial Museum, Harrisburg, Pennsylvania 17108. If you live in the western part, write the Section of Man, Carnegie Museum, Pittsburgh, Pennsylvania 15213. You will receive a site survey form on which you can identify and describe the site. If it appears to be an important site, we will assign a site number which will identify it permanently. Your information will be kept confidential.

Most people who collect Indian artifacts are rather protective about their sites—and understandably so—for many a good site has been destroyed through indiscriminate collecting by treasure seekers. For this reason the professional is bound not to violate the confidence of those who store their site information with

a museum or other institution interested in the scientific study of sites and collections.

Therefore, we cannot answer letters by giving locations of specific sites. Indian artifacts can be found on almost any plowed field along rivers and streams or near springs, and particularly at the junctions of waterways. The collector of course, should first ask the landowner's permission to hunt his fields. We hope that he will pursue his interest, not just as a collector, but as an amateur archeologist.

#### SUGGESTIONS FOR FURTHER READING

The most comprehensive book for this region is **The Archaeology of the Eastern United States**, edited by James B. Griffin (University of Chicago Press, 1952). It is a collection of scholarly essays covering both the Northeast and the Southeast.

Some good general works on western Pennsylvania have been published by the Carnegie Museum in Pittsburgh: **The Prehistory of the Upper Ohio Valley**, by William J. Meyer-Oakes (1955), covers the whole sequence of that region; **Archaic Hunters of the Upper Ohio Valley**, by Don W. Dragoo (1959), describes the Archaic period in western Pennsylvania in more detail; **Mounds for the Dead**, by the same author (1963), discusses the Adena culture of the Early Woodland period.

For northern Pennsylvania a very useful book is **The Archaeology of New York State**, by William A. Ritchie (Natural History Press, Garden City, N. J., 1965).

The Pennsylvania Historical and Museum Commission has published **Indians in Pennsylvania**, by Paul A. W. Wallace (1964, 1968), a historical account of the Delaware and other Indian tribes of this State; **Susquehannock Miscellany**, edited by John Witthoft and W. Fred Kinsey, III (1959), essays on the history and culture of the Susquehannock Indians; **Indian Prehistory of Pennsylvania**, by John Witthoft (1965); and other books and pamphlets of more specialized interest.

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